

ABSTRACT

A transistor circuit having the function of correcting variations in the threshold voltage of a thin-film transistor is provided.

The transistor circuit includes a plurality of thin-film transistors (Tr1 to Tr3) formed on a substrate and wiring which connects the gate, source, and/or drain of each of the transistors, so as to perform a predetermined operation. During the operation, a forward bias is applied between the gate and source of the thin-film transistor (Tr2) via the wiring repeatedly and/or continuously. A reverse bias is applied between the gate and source of the transistor (Tr2) in such timing that the operation is not disturbed so that the variations in the threshold voltage are suppressed. More specifically, an additional transistor (Tr3) connected in parallel to the transistor (Tr2) is driven complementarily, so as to generate the above-described timing where the operation is not disturbed, and the reverse bias is applied to the transistor (Tr2) in the generated timing.